10 . · · 6 · ·



UNITED STATES DEPARTMENT OF COMMERCE Patent and Trademark Office
ASSISTANT SECRETARY AND COMMISSIONER
OF PATENTS AND TRADEMARKS

Washington, D.C. 20231

OCTOBER 04, 2000

PTAS

CABOT CORPORATION
MICHELLE B. LANDO
157 CONCORD ROAD
BILLERICA, MASSACHUSETTS 01821





UNITED STATES PATENT AND TRADEMARK OFFICE NOTICE OF RECORDATION OF ASSIGNMENT DOCUMENT

THE ENCLOSED DOCUMENT HAS BEEN RECORDED BY THE ASSIGNMENT DIVISION OF THE U.S. PATENT AND TRADEMARK OFFICE. A COMPLETE MICROFILM COPY IS AVAILABLE AT THE ASSIGNMENT SEARCH ROOM ON THE REEL AND FRAME NUMBER REFERENCED BELOW.

PLEASE REVIEW ALL INFORMATION CONTAINED ON THIS NOTICE. THE INFORMATION CONTAINED ON THIS RECORDATION NOTICE REFLECTS THE DATA PRESENT IN THE PATENT AND TRADEMARK ASSIGNMENT SYSTEM. IF YOU SHOULD FIND ANY ERRORS OR HAVE QUESTIONS CONCERNING THIS NOTICE, YOU MAY CONTACT THE EMPLOYEE WHOSE NAME APPEARS ON THIS NOTICE AT 703-308-9723. PLEASE SEND REQUEST FOR CORRECTION TO: U.S. PATENT AND TRADEMARK OFFICE, ASSIGNMENT DIVISION, BOX ASSIGNMENTS, CG-4, 1213 JEFFERSON DAVIS HWY, SUITE 320, WASHINGTON, D.C. 20231.

RECORDATION DATE: 07/24/2000

REEL/FRAME: 011001/0414

NUMBER OF PAGES: 9

BRIEF: ASSIGNMENT OF ASSIGNOR'S INTEREST (SEE DOCUMENT FOR DETAILS).

ASSIGNOR:

CABOT CORPORATION

DOC DATE: 03/27/2000

ASSIGNEE:

CABOT MICROELECTRONICS CORPORATION

870 N. COMMONS DRIVE AURORA, ILLINOIS 60504

SERIAL NUMBER: 08891649 PATENT NUMBER: 6126853 FILING DATE: 07/11/1997 ISSUE DATE: 10/03/2000

SERIAL NUMBER: 09503996

FILING DATE: 02/14/2000

PATENT NUMBER: 09503996

ISSUE DATE:

SERIAL NUMBER: 09501221

FILING DATE: 02/10/2000

PATENT NUMBER:

ISSUE DATE:

SERIAL NUMBER: 08944036

FILING DATE: 09/29/1997

PATENT NUMBER:

ISSUE DATE:

011001/0414 PAGE 2

• • •

SERIAL NUMBER: PATENT NUMBER:	09487018	FILING DATE: 01/19/2000 ISSUE DATE:
SERIAL NUMBER: PATENT NUMBER:		FILING DATE: 07/11/1997 ISSUE DATE: 05/30/2000
SERIAL NUMBER: PATENT NUMBER:		FILING DATE: 08/04/1999 ISSUE DATE:
SERIAL NUMBER: PATENT NUMBER:	09084630	FILING DATE: 05/26/1998 ISSUE DATE:
SERIAL NUMBER: PATENT NUMBER:		FILING DATE: 12/19/1997 ISSUE DATE:
SERIAL NUMBER: PATENT NUMBER:	09062327 6062968	FILING DATE: 04/17/1998 ISSUE DATE: 05/16/2000
SERIAL NUMBER: PATENT NUMBER:		FILING DATE: 07/10/1998 ISSUE DATE: 10/03/2000
SERIAL NUMBER: PATENT NUMBER:	09105060	FILING DATE: 06/26/1998 ISSUE DATE:
SERIAL NUMBER: PATENT NUMBER:	08901803 6083419	FILING DATE: 07/28/1997 ISSUE DATE: 07/04/2000
SERIAL NUMBER:	09086659	FILING DATE: 05/29/1998 ISSUE DATE:
SERIAL NUMBER:	09440525	FILING DATE: 11/15/1999 ISSUE DATE:
SERIAL NUMBER:		FILING DATE: 03/18/1998 ISSUE DATE:
SERIAL NUMBER :	: 09105555 : 6063306	FILING DATE: 06/26/1998 ISSUE DATE: 05/16/2000
SERIAL NUMBER		FILING DATE: 06/26/1998 ISSUE DATE:
SERIAL NUMBER PATENT NUMBER		FILING DATE: 07/10/1998 ISSUE DATE: 09/12/2000
SERIAL NUMBER PATENT NUMBER		FILING DATE: 10/22/1999 ISSUE DATE:
SERIAL NUMBER PATENT NUMBER		FILING DATE: 08/13/1999 ISSUE DATE:
SERIAL NUMBER PATENT NUMBER		FILING DATE: 09/27/1999 ISSUE DATE:

011001/0414 PAGE 3

SERIAL NUMBER: 60142706 FILING DATE: 07/07/1999

PATENT NUMBER: ISSUE DATE:

SERIAL NUMBER: 09504058 FILING DATE: 02/14/2000

PATENT NUMBER: ISSUE DATE:

SERIAL NUMBER: 09429188 FILING DATE: 10/28/1999

PATENT NUMBER: ISSUE DATE:

SERIAL NUMBER: 09428965 FILING DATE: 11/04/1999

PATENT NUMBER: ISSUE DATE:

SERIAL NUMBER: 09440401 FILING DATE: 11/15/1999

PATENT NUMBER: ISSUE DATE:

SERIAL NUMBER: 60169382 FILING DATE: 12/07/1999

PATENT NUMBER: ISSUE DATE:

SERIAL NUMBER: 60148878 FILING DATE: 08/13/1999

PATENT NUMBER: ISSUE DATE:

SERIAL NUMBER: 60172540 FILING DATE: 12/17/1999

PATENT NUMBER: ISSUE DATE:

TONYA LEE, EXAMINER ASSIGNMENT DIVISION OFFICE OF PUBLIC RECORDS

ASSIGNMENT OF PATENT APPLICATIONS

Whereas, CABOT CORPORATION, hereinafter "ASSIGNOR," a corporation organized and existing under the laws of Delaware having its principal office at 75 State Street, Boston, Massachusetts 02109, is the sole and exclusive owner of record in the United States Patent and Trademark Office for the applications for Letters Patent of the United States of America listed on Schedule A attached.

CABOT MICROELECTRONICS CORPORATION, hereinafter "ASSIGNEE," a corporation organized and existing under the laws of Delaware and having a principal office at 870 N. Commons Drive, Aurora, Illinois 60504, is desirous of acquiring all right, title and interest in, to and under said aforementioned patent applications and the inventions respectively covered thereby.

NOW, THEREFORE, for good and valuable consideration, the receipt and sufficiency of which is hereby acknowledged, ASSIGNOR hereby sells, assigns and transfers to ASSIGNEE, and the successors, assigns and legal representatives of ASSIGNEE, the entire right, title and interest in and to the applications for Letters Patent of the United States of America listed on Schedule A attached and the inventions covered thereby, and in and to all Letters Patents to be obtained from said applications, including any continuations, divisions, continuations-in part claiming priority thereto, as well any reissues or reexaminations thereof (collectively referred to hereinafter as the "PROPERTY"), the same to be held and enjoyed by ASSIGNEE for its own use and enjoyment, and for the use and enjoyment of its successors, assigns and legal representatives, to the end of the terms for which said PROPERTY has been or will be granted, as fully and entirely as the same would have been held and enjoyed by ASSIGNOR if this assignment and sale had not been made; together with all claims by ASSIGNOR for damages by reason of infringement of the PROPERTY with the right to sue for, and collect the same for its own use and benefit, and for the use and benefit of its successors, assigns or other legal representatives.

ASSIGNOR agrees that it will, by its officers, employees, legal representatives or other persons duly authorized, communicate to ASSIGNEE or the representatives thereof, any facts known to it respecting said PROPERTY, and will, upon request and at ASSIGNEE's expense, testify in any legal proceedings, sign all lawful papers, make all rightful oaths, and generally perform all other further lawful acts, deemed necessary and expedient by ASSIGNEE or by counsel of ASSIGNEE, to assist or enable ASSIGNEE to obtain and enforce full benefits from the rights and interests herein assigned. ASSIGNOR additionally agrees to execute short form copies of this assignment or portions thereof regarding any or all of the aforementioned PROPERTY, as required by ASSIGNEE in the future.

ASSIGNOR agrees to waive all its rights and privileges to attack the utility, novelty, validity or enforceability of any or all of the aforesaid PROPERTY which mature from the listed applications which ASSIGNOR has assigned as against any one claiming a right under any or all of the aforementioned PROPERTY under ASSIGNOR's assignment or grant.

IN WITNESS WHEREOF, CABOT CORPORATION has caused its name to be signed by its duly authorized representative and its corporate seal to be affixed hereto this 27 day of March, 2000.

CABOT CORPORATION

Name: Samuel W. Bodman

Title: Chairman and CEO

[CORPORATE SEAL]

Witnessed:

By: Brile 95 W

Name: Brian A. Berh.

Title: Coursel

UNITED STATES OF AMERICA COMMONWEALTH OF MASSACHUSETTS:

COUNTY OF SUFFOLK

On this _=?7*10 day of March, 2000, before me, a Notary Public in and for the above mentioned county and state, personally appeared Somiel W Balaxin, to me known and known to me to be the person who signed the foregoing Assignment on behalf of CABOT CORPORATION and who being duly sworn by me, did depose and say that -s/he is the Chief Executive Cricer of CABOT CORPORATION, the company described in and on whose behalf-s/he has executed the foregoing instrument; and that 5/he is so authorized to execute this instrument on behalf of said corporation.

Notary Public
My Commission Expires 3/20/2003

[NOTARIAL SEAL]

mmdapplnasg2.doc

Schedule A

Docket No.	Appln. No.	Appln. Date
96071ACIP	08/891649	11JL1997
96071ACIP2	08/944036	29SE1997
96071ADIV	09/366588	04AU1999
96073CIP2DIV	09/503996	14FE2000
96073CIPDIV	09/487018	19JA2000
96092	09/084630	26MY1998
96092DIV	09/501221	10FE2000
96093CIP3	08/891468	10JL1997
96098CIP	08/994894	19DE1997
96119CIP1	09/062327	17AP1998
96119CIP2	09/114003	10JL1998
96125	09/105060	26JE1998
97045	08/901803	28JL1997
97045CIP	09/086659	29MY1998
98003	09/440525	15NO1999
98010	09/040630	18MR1998
98011	09/105555	26JE1998
98012	09/105065	26JE1998
98068	09/113248	10JL1998
98116	09/425473	22OC1999
98124P	60/148813	13AU1999
98125	09/405249	27SE1999
98126P	60/142706	07JL1999
98134	09/504058	14FE2000

Schedule A Cont'd.

Docket No.	Appln. No.	Appln. Date
99001	09/429188	28OC1999
99073	09/428965	04NO1999
99074	09/440401	15NO1999
99077P	60/169382	07DE1999
99096P	60/148878	13AU1999
99106P	60/172540	17DE1999

PARETHENT OF COMPLETE

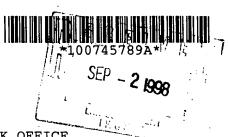
98010 USA (1-14)

UNITED STATES DEPARTMENT OF C MMERCE Patent and Trademark Office

ASSISTANT SECRETARY AND COMMISSIONER OF PATENTS AND TRADEMARKS Washington, D.C. 20231

AUGUST 26, 1998

CABOT CORPORATION MICHELLE B. LANDO LAW DEPARTMENT 157 CONCORD ROAD BILLERICA, MA 01821 PTAS



UNITED STATES PATENT AND TRADEMARK OFFICE NOTICE OF RECORDATION OF ASSIGNMENT DOCUMENT

THE ENCLOSED DOCUMENT HAS BEEN RECORDED BY THE ASSIGNMENT DIVISION OF THE U.S. PATENT AND TRADEMARK OFFICE. A COMPLETE MICROFILM COPY IS AVAILABLE AT THE ASSIGNMENT SEARCH ROOM ON THE REEL AND FRAME NUMBER REFERENCED BELOW.

PLEASE REVIEW ALL INFORMATION CONTAINED ON THIS NOTICE. THE INFORMATION CONTAINED ON THIS RECORDATION NOTICE REFLECTS THE DATA PRESENT IN THE PATENT AND TRADEMARK ASSIGNMENT SYSTEM. IF YOU SHOULD FIND ANY ERRORS OR HAVE QUESTIONS CONCERNING THIS NOTICE, YOU MAY CONTACT THE EMPLOYEE WHOSE NAME APPEARS ON THIS NOTICE AT 703-308-9723. PLEASE SEND REQUEST FOR CORRECTION TO: U.S. PATENT AND TRADEMARK OFFICE, ASSIGNMENT DIVISION, BOX ASSIGNMENTS, CG-4, 1213 JEFFERSON DAVIS HWY, SUITE 320, WASHINGTON, D.C. 20231.

RECORDATION DATE: 06/05/1998

REEL/FRAME: 9251/0431 NUMBER OF PAGES: 5

BRIEF: ASSIGNMENT OF ASSIGNOR'S INTEREST (SEE DOCUMENT FOR DETAILS).

ASSIGNOR:

KAUFMAN, VLASTA BRUSIC

DOC DATE: 05/26/1998

ASSIGNOR:

KISTLER, RODNEY C.

DOC DATE: 05/26/1998

ASSIGNOR:

WANG, SHUMIN

DOC DATE: 05/26/1998

ASSIGNEE:

CABOT CORPORATION
75 STATE STREET
BOSTON, MASSACHUSETTS 02109

SERIAL NUMBER: 09040630

PATENT NUMBER:

FILING DATE: 03/18/1998

ISSUE DATE:

FILE UNDATED _ 9/3/98

9251/0431 PAGE 2

SEDLEY PYNE, PARALEGAL ASSIGNMENT DIVISION OFFICE OF PUBLIC RECORDS

Form PTO-1595	06-23	-1998	U.S. DEPARTMENT OF COMMERCI Patent and Trademark Office
			IEET
To the Honorable Co	ommissioner of Pa. 10074	5789	tached original documents or copy thereof
Name of conveyi		2. Name and addr	ress of receiving party(ies):
Vlasta Brusi]	IN UL
Rodney C. k	Cistler	Name:	Cabot Corporation
Shumin Wa	ng	_	
		Internal Address:	
		1	
		1	
Additional name(s)	of conveying party(ies) attached? No	Street Address:	75 State Street
3. Nature of Conve			
_			777
Assignment		City: Boston	State: MA ZIP 02109
Security Ag	greement	Additional name(s) & address(es) attached? Yes N
		Additional name(3) to address(es) attached
Execution Date(s):		1	
	nber(s) or patent number(s):		
If this document is	being filed together with a new application	tion, the execution d	ate of the application is:
A. Patent Applicat	ion No.(s)	B. Patent No.(s)	
09/040,63	30		
0,7010,00			
Additional number		Additional number	
	ess of party to whom correspondence	Total Number of	applications and patents involved:
concerning doc	ument should be mailed:		
Name:	Michelle B. Lando		
Internal Address:	Law Department	Total fee (37 CFF	R 3.41): \$ 40.00
		☐ Enclose	rd
Street Address:	Cabot Corporation	🗌 🔯 Authori	zed to be charged to deposit account
	157 Concord Road		
City: Billerica	State MA ZIP 01821	8. Deposit Acco	
			plicate Copy of this page is attached.
		USE THIS SPACE	
9. Statement and	signature.		
To the best of	humaniadas and haliaf the foregoing inf	armation is true and	correct and any attached copy is a true cop
of the original doc		manon is iruc una	correct and any anaence copy is a visc cop
oj ine originar doe	^	. 1	. / . / 0 .
Michelle B. Lando	S hichell	L. Signature	6/2/98
Name of Person S	igning	Signature	Date
		Total	number of pages including cover sheet: 5
OMB No. 0651-001		detach this portion:	
	Do not o	uctaen uns portion.	
Mail documents to l	be recorded with required cover sheet inform	nation to:	
	•		1
7/4008 TOUGHART ASS		of Patents and Tradem x Assignments	arks
2/1998 JSHABAZZ 0000	Washii	ngton, D.C. 20231	
C 581 AO 00) CH	-	

Public burden reporting for this sample cover sheet is estimated to average about 30 minutes per document to be recorded, including time for reviewing the document and gathering the data needed, and completing and reviewing the sample cover sheet. Send comments regarding this burden estimate to the U.S. Patent and Trademark Office, Office of Information Systems, PK2-1000C, Washington, D.C. 20231, and to the Office of Management and Budget, Paperwork Reduction Project, (0651-0011), Washington, D.C. 20503.

ASSIGNMENT

WHEREAS, we, Vlasta Brusic Kaufman of 721 Easton Avenue, Geneva, Illinois 60134, a citizen of the United States of America; Rodney C. Kistler of 42W597 Steeple Chase, St. Charles, Illinois 60175, a citizen of the United States of America; and Shumin Wang of 1006 Dakota Circle, Naperville, Illinois 60563, a citizen of the People's Republic of China, having invented the subject matter described in the U. S. Patent Application entitled "CHEMICAL MECHANICAL POLISHING SLURRY USEFUL FOR COPPER SUBSTRATES," the specification of which was filed on March 18, 1998, as United States Patent Application Serial No. 09/040,630; and

WHEREAS, Cabot Corporation, a corporation organized and existing under and by virtue of the laws of the State of Delaware, doing business at 75 State Street, Boston, Massachusetts 02109, is desirous of acquiring the entire right, title and interest in and to said application and the invention therein described and claimed and any Letters Patent that may be issued upon said application or for the improvements therein contained.

NOW THEREFORE, for and in consideration of the sum of One Dollar (\$1.00) lawful money of the United States and other valuable considerations, in hand paid to us, the receipt and sufficiency whereof is hereby acknowledged, we, Vlasta Brusic Kaufman, Rodney C. Kistler, and Shumin Wang have sold, assigned and transferred and do hereby sell, assign and transfer unto Cabot Corporation, its successors and assigns, the entire right, title and interest in and to said application and the invention therein contained, including the right to apply for any Letters Patent in the United States of America and in any and all foreign countries on said invention, and any and all other applications for Letters Patent on said invention, in whatsoever countries, including all divisional, renewal, substitution, continuation, continuation-in-part, reissue, re-examination and Convention applications based upon said invention or upon said application, to the full end of the term or terms for which said Letters Patent may be issued, and every priority right that is or may be predicated upon or arise from said invention, said application and said Letters Patent, the same to be held and enjoyed by

Cabot Corporation, its successors and assigns, the same as it would have been held and enjoyed by us if this assignment and sale had not been made.

And we hereby authorize Cabot Corporation, to file patent applications in any or all countries on any or all of said invention in our name or in the name of Cabot Corporation, or otherwise as Cabot Corporation, may deem advisable, under any International Convention or otherwise.

And we hereby authorize the Commissioner of Patents of the United States and the empowered officials of all other governments to issue or transfer all said Letters Patent to Cabot Corporation, as assignee of the entire right, title and interest therein or otherwise as Cabot Corporation, may direct, in accordance with this instrument of assignment.

We hereby represent and warrant that there are no rights or interests inconsistent with the rights and interests granted herein and that we will not execute any instrument or grant or transfer any rights or interests inconsistent with the rights and interest granted herein, and that we, Vlasta Brusic Kaufman, Rodney C. Kistler and Shumin Wang, bind ourselves and our heirs, executors, administrators and legal representatives, as the case may be, to execute and deliver to Cabot Corporation, its successors and assigns, any further documents or instruments and do any and all further acts that may reasonably be deemed necessary by Cabot Corporation, to enable Cabot Corporation, its successors or assigns, to file applications for the invention in any country where it may elect to file such applications, and that may be necessary to vest in Cabot Corporation, its successors and assigns, the title herein conveyed or intended so to be, and to enable such title to be recorded in the United States and foreign countries where such application or applications may be filed.

And we further covenant and agree, in consideration of the premises, that we, our executors and administrators, will at any time, upon request, communicate to Cabot Corporation, its successors and assigns, any facts relating to the invention and the improvements contained therein and the history thereof, known to us or our executors and administrators, and that we will testify as to the same in any interference or other litigation when requested so to do by Cabot Corporation, its successors and assigns.

and seal this 26th day of May, 1998.	, ·
	Vlasta Brusic Kaufman
	Vlasta Brusic Kaufman
STATE OF ILLINOIS) ss. COUNTY OF DU PAGE)	
On this day of May, 1998, before me Kaufman, to me known and known to me to be the in executed the foregoing instrument, and she duly acknow same for the purpose therein set forth.	ndividual described herein and who
OFFICIAL SEAL HOLLY A. BARRY NOTARY PUBLIC, STATE OF ILLUMME MY COMMISSION EXPIRES 8-3-63	NOTARY PUBLIC My Commission Expires:
IN TESTIMONY WHEREOF, I, Rodney C. Kiss seal this day of May, 1998.	tler, have hereunto set my hand and
	Rodney C. Kistler
STATE OF ILLINOIS) ss. COUNTY OF DU PAGE)	
On this day of May, 1998, before me pe to me known and known to me to be the individual des foregoing instrument, and he duly acknowledged to me purpose therein set forth.	scribed herein and who executed the
OFFICIAL SEAL. HOLLY A. BARRY NOTARY PUBLIC, STATE OF CLUTTIS MY COMMISSION EXPIRES 6-19-10	NOTARY PUBLIC My Commission Expires: 613196

IN TESTIMONY WHEREOF, I, Vlasta Brusic Kaufman, have hereunto set my hand

My Commission Expires: 613199

IN TESTIMONY WI	HEREOF, 1, Shumin Wang 1998.	, have hereunto set	my hand and seal
		Shumin Wang	Way
STATE OF ILLINOIS COUNTY OF DU PAGE)) ss.		
	,		101

On this \(\frac{1}{\lambda \lambda \lambda \lambda \lambda \lambda \text{to me known and known to me to be the individual described herein and who executed the foregoing instrument, and she duly acknowledged to me that she executed the same for the purpose therein set forth.

OFFICIAL SEAL
HOLLY A. BARRY
NOTARY PUBLIC, STATE OF ELECTIS
MY COMMISSION EXPIRES 0.0.60

NOTARY PUBLIC

My Commission Expires: \$13163

assign19mmd